

(b) a nucleotide sequence encoding a protein having the amino acid sequence of SEQ ID NO: 3 which has piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof;

(c) a nucleotide sequence consisting of nucleotides 2855 to 4387 of SEQ ID NO: 2 encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof;

Sub C2
(d) a nucleotide sequence consisting of nucleotides 2077 to 4578 of SEQ ID NO: 2 encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof;

B1
(e) a nucleotide sequence which has at least 70% homology with the nucleotide sequence of (c) encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof;

(f) a fragment of nucleotide sequence (a) or (b) encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof ; and

(g) a nucleotide sequence which hybridizes under stringent conditions to sequence (a), (b), (c), (d), (e) or (f).

17. (New) The isolated nucleotide sequence according to claim 16, which is the nucleic acid sequence of SEQ ID NO: 2 encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof.

Sub 3

18. (New) The isolated nucleotide sequence according to claim 16, which is the nucleotide sequence encoding a protein having the amino acid sequence of SEQ ID NO: 3 which has piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof.

19. (New) The isolated nucleotide sequence according to claim 16, which is the nucleotide sequence consisting of nucleotides 2855 to 4387 of SEQ ID NO: 2 encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof.

20. (New) The isolated nucleotide sequence according to claim 16, which is the nucleotide sequence consisting of nucleotides 2077 to 4578 of SEQ ID NO: 2 encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof.

B1 21. (New) The isolated nucleotide sequence according to claim 16, which is the nucleotide sequence which has at least 70% homology with the nucleotide sequence of (c) encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof.

22. (New) The isolated nucleotide sequence according to claim 16, which is the fragment of nucleotide sequence (a) or (b) encoding a protein having piperidine-6-carboxylic acid dehydrogenase activity, or a complementary strand thereof.

23. (New) The isolated nucleotide sequence according to claim 16, which is the nucleotide sequence which hybridizes under stringent conditions to sequence (a), (b), (c), (d), (e) or (f).

24. (New) The isolated nucleotide sequence according to claim 16, which is obtained from a bacterium belonging to Flavobacterium lutescens.

25. (New) A nucleic acid construct comprising the nucleic acid sequence according to claim 16.

26. (New) The nucleic acid construct according to claim 25, which is contained in Flavobacterium lutescens IFO 3084 (pCF213) deposited under accession number FERM BP-6797.

27. (New) A host cell comprising the nucleic acid construct according to claim 25, wherein the nucleic acid sequence encodes a protein having piperidine-6-carboxylic acid dehydrogenase activity.

28. (New) A process for producing L-homoglutamic acid, which comprises culturing the host cell according to claim 27 under suitable conditions to produce the protein in the presence of 1-piperidine-6-carboxylic acid, and recovering L-homoglutamic acid.

29. (New) The process according to claim 28, wherein the host cell is a bacterium belonging to the genus Flavobacterium.

30. (New) The process according to claim 28, wherein the host cell is Flavobacterium lutescens IFO 3084 (pCF213) deposited under accession number FERM BP-6797.

IN THE SEQUENCE LISTING

Please replace the Sequence Listing with the attached revised Sequence Listing.